



**In The United States Patent and Trademark Office
On Appeal From The Examiner To The Board
of Patent Appeals and Interferences**

In re Application of: Billy G. Moon
Serial No.: 09/814,609
Filing Date: March 21, 2001
Examiner: Christopher Grey
Group Art Unit: 2667
Title: Error Correction Using Redundant Packet Streams in
Wireless Communications Systems

Mail Stop: Appeal Brief - Patents
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

Dear Sir:

**CERTIFICATE OF MAILING
BY EXPRESS MAIL**

Exp. Mail Receipt No. EV 733644634 US

I hereby certify that this communication is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" under 37 C.F.R. § 1.10 on the date indicated below and is addressed to Commissioner For Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

Willie Jiles

Willie Jiles

Date: December 28, 2005

Appeal Brief

Appellant has appealed to the Board of Patent Appeals and Interferences from the decision of the Examiner finally rejecting Claims 1-34, as evidenced in the Final Office Action mailed August 1, 2005 and the Advisory Action mailed October 24, 2005. Appellant filed a Notice of Appeal on October 31, 2005. Appellant respectfully submits this Appeal Brief with the statutory fee of \$500.00.

Table of Contents

	<u>Page</u>
Real Party In Interest	3
Related Appeals and Interferences	4
Status of Claims	5
Status of Amendments	6
Summary of Claimed Subject Matter	7
Ground of Rejections to be Reviewed on Appeal	11
Argument	12
I. The Rejection of Claims 1, 8, 9, 10, 17, 18, 25, 26, 29 and 32 is Improper	12
II. The Rejection of Claims 2, 3, 11, 12, 19, 20, 27, 28, 30, 31, 33 and 34 is Improper.....	16
Conclusion	18
Appendix A: Claims on Appeal.....	19
Appendix B: Evidence.....	28
Appendix C: Related Proceedings.....	29

Real Party In Interest

This application is currently owned by Cisco Technology, Inc., as indicated by an assignment recorded on March 21, 2001, in the Assignment Records of the United States Patent and Trademark Office at Reel 011639, Frames 0806-0807.

Related Appeals and Interferences

There are no known appeals or interferences which will directly affect or be directly affected by or have a bearing on the Board's decision regarding this appeal.

Status of Claims

Claims 1-34 are pending in this application and all stand rejected under a final Office Action mailed August 1, 2005. Appellant presents Claims 1-34 for appeal. Appendix A shows all pending claims.

Status of Amendments

The Examiner has entered the amendments that were submitted before the final Office Action mailed August 1, 2005. No further amendments have been submitted.

Summary of Claimed Subject Matter

FIGURE 1 of the application illustrates an exemplary communications system, indicated generally at 10, that includes mobile units 12 coupled via wireless links to a managed network 14 that may be coupled to outside networks 16. Managed network 14 includes base transceiver stations 18, gateways 20, a core packet network (CPN) 22, and a roam manager 24. In general, mobile unit 12 establishes a wireless link with one or more transceiver stations 18 to communicate with other mobile units 12 or with devices coupled to outside networks 16. Managed network 14 supports packet voting between multiple copies of each packet received from mobile unit 12. More specifically, CPN 22 may select between copies of a packet received from mobile unit 12 by multiple transceiver stations 18, and gateway 20 may forward a selected one of the copies to an appropriate outside network 16. *Page 6, lines 2-12.*

Mobile units 12 provide wireless communications using any suitable wireless communications protocol and may establish wireless links with transceiver stations 18 in managed network 14. For example, mobile units 12 may be analog or digital cellular telephones, personal digital assistants (PDAs), pagers, or other suitable wireless devices providing wireless services for subscribers. Wireless links represent any channel or channels established between devices for the persistent, periodic, or sporadic communication of information via any suitable wireless communications protocols. *Page 6, lines 13-20.*

Transceiver stations 18 represent hardware and/or software supporting wireless links with mobile units 12 using any suitable wireless communications protocol. Transceiver stations 18 receive information from mobile units 12 in packets or receive information from mobile units 12 and packetize the information for packet-switched communication via CPN 22. CPN 22 represents any collection and arrangement of hardware and/or software providing packet-switched communications between transceiver stations 18, gateways 20, and roam managers 24. For example, CPN 22 may include routers, bridges, gateways, switches, or other suitable network equipment providing packet-switched communications. *Page 6, line 28 – Page 7, line 4.*

Roam manager 24 represents hardware and/or software that monitors, manages and controls wireless links between mobile units 12 and transceiver stations 18. As part of this management and control, roam manager 24 facilitates the roaming of mobile units 12 between transceiver stations 18. Roaming refers to any activities supporting communications between mobile unit 12 and multiple transceiver stations 18 or supporting movement of mobile units 12 between areas serviced by different transceiver stations 18 or other wireless services equipment. Therefore, roam manager 24 supports management and control of links between mobile units 12 and transceiver stations 18 to provide substantially uninterrupted wireless services. *Page 7, lines 15-23.*

In addition to directing communications between transceiver stations 18 and mobile unit 12, roam manager 24 may also establish a selection group associated with the communications session to aid in streaming multiple copies of inbound and outbound packets through managed network 14. For example, managed network 14 may use the selection group to select from multiple copies of each inbound packet received from mobile unit 12 and to distribute copies of each outbound packet to transceiver stations 18 communicating with mobile unit 12. To establish the selection group, roam manager 24 may include the original transceiver station 18 providing a wireless link to mobile unit 12 and candidate transceiver stations 18. After determining transceiver stations 18 in the selection group, roam manager 24 propagates this selection group information to devices in managed network 14, including components of CPN 22. This propagation establishes a hierarchy for selecting between multiple copies of each packet received by transceiver stations 18 in the selection group. During roaming of mobile unit 12, each transceiver station 18 in the selection group receives a copy of each packet transmitted by mobile unit 12. The selection group hierarchy provides a mechanism for selecting one of the copies of each packet transmitted by mobile unit 12 to communicate to the remote location. *Page 9, line 31 – Page 10, line 16.*

FIGURE 9 of the application illustrates an exemplary method of error correction using concatenated error codes from redundant packet streams. The exemplary method begins at step 250 where a selection group is formed for a mobile unit 12, as described above. At step 252, mobile unit 12 generates coded redundant content for each transceiver station 18

in the selection group. Each set of redundant content (the content generated for each transceiver station 18) is coded using a punctured code or other appropriate code that is orthogonally related to the code used for the other sets of redundant content. Therefore, the codes used to encode the redundant sets of content are related and may be used together to decode the different sets of redundant content when received by transceiver stations 18. The multiple transceiver stations 18 receive the coded content from mobile unit 12 at step 254. At step 256, each transceiver station 18 generates a graded packet including the coded content and the value of an appropriate metric, as described above. However, such grading of the received coded content may not be performed in particular embodiments. In such cases, a packet is generated that includes the coded content but not the metric value. *Page 28, lines 18-32.*

The packet including the coded content is communicated to an appropriate decoder 208 at step 258. This decoder 208 may be included in or associated with a router 42 in the selection group or any other appropriate network device. At step 260, decoder 208 receives two or more packets including redundant coded content from two or more transceiver stations 18. At step 262, decoder 208 concatenates the two or more orthogonally related codes associated with the redundant packets and then uses the concatenated code (the cross product of the codes) to decode the content and generate two or more redundant packets including the decoded content. One of the redundant packets is then selected at step 264 using any appropriate technique and communicated to the destination. This selection may be performed by a router 42 associated with decoder 208 or the multiple redundant packets may be communicated to a router 42 after decoding. *Page 27, lines 1-12.*

The decoded content in the two or more packets may be different due to different transmission errors in the various communication channels 206 over which the content was communicated from mobile unit 12. However, the use of the concatenated code may produce two redundant packets with identical decoded content. The orthogonally related codes may be concatenated using any appropriate technique known in the art. For example, the multiple orthogonal codes may be generated such that the punctures in each code may be filled by another code (there are no common punctures between the codes). Therefore, the multiple

codes may be combined to create a code with no punctures. Alternatively, the codes may be concatenated using more advanced techniques such as the use of serially concatenated convolutional codes (SCCC), parallel concatenated convolutional codes (PCCC), or any other appropriate techniques. *Page 27, lines 13-24.*

As an example, a communications system may be implemented according to the method of FIGURE 9 that includes a mobile unit that transmits redundant content to a plurality of destinations. A copy of the content that is transmitted to each destination is encoded using a code that is related to the codes used to encode copies of the content transmitted to the other destinations. The system further includes a number of base transceiver stations. Each base transceiver station receives a copy of the coded content from the mobile unit, generates a packet including the coded content, and communicates the packet. Furthermore, the system includes a decoder that receives a number of packets that each include a copy of the coded content and that are each generated at a different base transceiver station. The decoder decodes the content in the packets by concatenating the related codes used to encode each copy of the content and generates one or more redundant packets including the decoded content. *Page 3, lines 5-16.*

Ground of Rejections to be Reviewed on Appeal

Appellant requests that the Board review the Examiner's rejection of Claims 1, 8, 9, 10, 17, 18, 25, 26, 29 and 32 under 35 U.S.C. §103(a) as being unpatentable over U.S. Patent No. 6,570,871 issued to Schneider ("*Schneider*") in view of U.S. Patent No. 6,272,134 issued to Bass et al. ("*Bass*").

Appellant further requests that the Board review the Examiner's rejection of Claims 2, 3, 11, 12, 19, 20, 27, 28, 30, 31, 33 and 34 under 35 U.S.C. §103(a) as being unpatentable over *Schneider* in view of *Bass* and in further view of U.S. Patent No. 6,785,254 issued to Korus et al. ("*Korus*").

Argument

The Examiner's rejection of Claims 1-34 is improper, and the Board should withdraw the rejection for the reasons given below.

I. The Rejection of Claims 1, 8, 9, 10, 17, 18, 25, 26, 29 and 32 is Improper

The Examiner rejects Claims 1, 8, 9, 10, 17, 18, 25, 26, 29 and 32 under 35 U.S.C. §103(a) as being unpatentable over U.S. Patent No. 6,570,871 issued to Schneider ("*Schneider*") in view of U.S. Patent No. 6,272,134 issued to Bass et al. ("*Bass*").

In order to establish a *prima facie* case of obviousness, three requirements must be met: (1) there must be some suggestion or motivation, either in the references themselves or in the knowledge available to one skilled in the art, to modify a reference or combine multiple references; (2) there must be a reasonable expectation of success; and (3) the prior art reference (or combination of references) must teach or suggest all of the claim limitations. M.P.E.P. § 2143. In the present case, a *prima facie* case of obviousness cannot be maintained at least because (even assuming for the sake of argument that the references did suggest or motivate a combination of the references to a person of ordinary skill in the art at the time of the invention) *Schneider* and *Bass* whether considered singly, in combination with one another, or in combination with information generally available to those of ordinary skill in the art at the time of the invention, fail to disclose all of the elements of the pending claims.

Claim 1 recites the following limitations:

A communications system, comprising:

a mobile unit operable to transmit redundant content to a plurality of base transceiver stations, a copy of the content transmitted to each base transceiver station being encoded using a code that is related to the codes used to encode copies of the content transmitted to the other base transceiver stations;

a plurality of base transceiver stations, each base transceiver station operable to:

receive a copy of the coded content from the mobile unit;
generate a packet including the coded content; and
communicate the packet; and

a decoder operable to:

receive a plurality of packets each including a copy of the coded content, each packet generated at a different base transceiver station;
decode the content in the packets by concatenating the related codes used to encode each copy of the content; and
generate one or more redundant packets including the decoded content.

Independent Claims 10, 18, 26, 29, and 32 recite similar, although not identical, limitations.

Claim 1 (as well as Claims 10, 18, 26, 29, and 32) are allowable because neither *Schneider* nor *Bass* disclose, teach, or suggest each and every one of these limitations. For example, neither reference discloses “a copy of the content transmitted to each base transceiver station being encoded using a code that is related to the codes used to encode copies of the content transmitted to the other base transceiver stations.” Although *Schneider* discloses that the mobile station uses a speech coder, as pointed out by the Examiner, there is no disclosure in *Schneider* that multiple copies of the same content are coded using related codes. Even if it were obvious to combine *Schneider*’s coded signals with *Bass*’s multicasting feature, as asserted by the Examiner, there is no disclosure in either reference that multiple copies of the same content are coded using *related* codes. The Examiner simply argues that the art teaches sending multiple copies of content (multicasting). Sending (or receiving) multiple copies of content certainly does not disclose that the copies of the content are encoded using related codes, as required by these claims.

In addition, neither *Schneider* nor *Bass* disclose, teach, or suggest “a plurality of base transceiver stations, each base transceiver station operable to: receive a copy of the coded content from the mobile unit [and] generate a packet including the coded content.” The Examiner asserts that this limitation is disclosed in *Schneider* at Column 12, lines 8-16. The cited passage recites the following:

“As described below, the modulated wireless signal output by the CDMA digital telephone is received at a base station, and the modulated wireless signal is demodulated by despread the signal with the appropriate codes to

recover the encoded digital voice samples. After the error correction codes are stripped off, the decoded digital voice samples corresponding to the output of the speech coder are packetized for transmission via the packet switched network.” (emphasis added)

The Examiner interprets this passage to disclose that the base station, after receiving the modulated wireless signal output, later demodulates, decodes, and packetizes the output. However, the only disclosure that this passage definitively makes about the base station is that “the modulated wireless signal output...is received at a base station.” The passage does not disclose that the functions performed after the base station receives the signal output – for example, demodulating, decoding, and packetizing – actually take place at the base station. In fact, the passage itself directs the reader to refer to the ensuing paragraphs, by stating “as described below,” to seek clarification about what the passage discloses.

The ensuing paragraphs and references to figures clearly show that *Schneider* does not teach that any packetization is performed within the base station. In Figure 5, *Schneider* discloses that the base station (66) includes antennas (162a and 162b), a filter (164), a demodulator (166), a TDMA detector (168), possibly a decoder (172), and a transcoder (170). *See Column 12; lines 17-49; Figure 6A; Column 13, lines 30-33.* None of these devices perform any sort of packetization. In fact, *Schneider* discloses that packetization only occurs at the gateway interface, and a signal must travel from the base station, then through a base station controller, and finally through a mobile switching center to reach this interface. *See Column 15, lines 16-33; Figures 2, 8A and 8B.* Therefore, the base transceiver station in *Schneider* is not operable to generate a packet including the coded content, as required by the claims.

Furthermore, neither *Schneider* nor *Bass* disclose, teach, or suggest “a decoder operable to: receive a plurality of packets each including a copy of the coded content, each packet generated at a different base transceiver station; [and] decode the content in the packets by concatenating the related codes used to encode each copy of the content.” For an alleged teaching of this limitation, the Examiner refers to Column 9, line 56 through Column

10, line 9 and Column 12, lines 17-49 of *Schneider*. The cited text refers to a channel coder of a mobile station that may use concatenation channel coding, and a decoder located in the base station or mobile switching center that presumably decodes the concatenation code. This codification and decodification in *Schneider* is different from the claim limitation in the present Application. In the present Application, the decoder is operable to decode the content in a plurality of packets generated at different base transceiver stations by concatenating the related codes used to encode each copy of the content. In other words, the related codes are used together in decoding the coded content. *Schneider* simply does not teach this concatenation decoding procedure. The decoder in *Schneider* at Column 12, lines 17-49 does not receive packets generated at different base transceiver stations and does not decode these packets by concatenating the related codes encoding the copies of the content.

For at least these reasons, Appellant respectfully submits that Claims 1, 10, 18, 26, 29, and 32, as well as the claims that depend from these independent claims, are in condition for allowance. Therefore, favorable action is requested.

Furthermore, Claims 4, 5, 13, 14, 21, and 22 are rejected under 35 U.S.C. §103(a) as being unpatentable over *Schneider* in view of *Bass* and in further view of U.S. Patent No. 6,549,542 issued to Dong et al. ("*Dong*"). Claims 4, 5, 13, 14, 21 and 22 each depend from one of independent Claims 1, 10, and 18 discussed above. At least because they depend from an allowable independent claim, Appellant respectfully requests allowance of Claims 4, 5, 13, 14, 21 and 22.

Moreover, Claims 6, 7, 15, 16, 23, and 24 are rejected under 35 U.S.C. §103(a) as being unpatentable over *Schneider* in view of *Bass* and in further view of U.S. Patent No. 6,611,513 issued to ten Brunk ("*ten Brunk*"). Claims 6, 7, 15, 16, 23 and 24 each depend from one of independent Claims 1, 10, and 18 discussed above. At least because they depend from an allowable independent claim, Appellant respectfully requests allowance of Claims 6, 7, 15, 16, 23 and 24.

II. The Rejection of Claims 2, 3, 11, 12, 19, 20, 27, 28, 30, 31, 33 and 34 is Improper

The Examiner rejects Claims 2, 3, 11, 12, 19, 20, 27, 28, 30, 31, 33, and 34 under 35 U.S.C. §103(a) as being unpatentable over *Schneider* in view of *Bass* and in further view of U.S. Patent No. 6,785,254 issued to Korus et al. ("*Korus*").

A. Claims 2, 11, 19, 27, 30, and 33 Are Allowable

None of the cited references disclose the limitations of Claims 2, 11, 19, 27, 30, and 33. For example, Claim 2 requires "a router operable to: receive a plurality of redundant packets from the decoder; and select one of the redundant packets using a packet selection technique." The Examiner asserts that these limitations are disclosed in *Korus* (citing the Abstract, Column 3, lines 18-36, Column 6, lines 40-65, Column 10, lines 42-55, and Column 12, line 61 through Column 13, line 9). However, none of these passages, nor any other portion of *Korus*, disclose receiving a plurality of redundant packets at a router and selecting one of these packets using a packet selection technique. The Abstract and text cited at Column 12, line 61 through Column 13, line 9 disclose selecting a network routing device from among a number of network routing devices as a function of various communication system performance and/or quality of service attributes. This is not the same as a single router receiving a plurality of redundant packets and then selecting one of the redundant packets using a packet selection technique. The cited text at Column 3, lines 18-36 discloses several multicast IP protocols available for use in packet network 201 of the system 200. However, neither these protocols nor anything else in the cited text discloses a router selecting one packet from a number of redundant packets using a packet selection technique. The cited text at Column 6, lines 40-65 discloses a router capable of forwarding data based on the Internet Group Management Protocol and a multicast routing protocol. However, this router does not select one packet from a number of redundant packets using a packet selection technique, as required by the claim. The cited text at Column 10, lines 42-55 discloses a step in a flowchart where one of the unique multicast IP addresses within the map of the selected Rendezvous Point is selected. Even assuming, as the Examiner does, that these unique IP addresses are stored in packets, neither the cited text nor anything else in *Korus* discloses that these IP address packets are redundant, as required by the claim limitation. Therefore, for at least these reasons (in addition to depending from an allowable

independent claim), Appellant respectfully requests allowance of Claims 2, 11, 19, 27, 30 and 33.

B. Claims 3, 12, 20, 28, 31, and 34 Are Allowable

Claims 3, 12, 20, 28, 31, and 34 add even further limitations to Claims 2, 11, 19, 27, 30, and 33, respectively. For example, Claim 20 requires “selecting a redundant packet based on a value of a metric included in each packet, the value of the metric in each packet associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station.” The Examiner asserts that these limitations are disclosed in *Korus* (citing the Abstract, Column 3, lines 18-36, and Column 12, line 61 through Column 13, line 9). The Examiner also argues that *Korus* discloses a controller selecting a unique multicast IP address based on a number of metrics, presumably combining the text in Column 10, lines 42-55 and Column 12, line 61 through Column 13, line 9. *Korus*, however, only discloses selecting a network routing device from among a number of network routing devices based on certain attributes. *See Column 12, line 61 through Column 13, line 9*. Furthermore, even assuming the unique IP addresses are stored in packets, *Korus* does not disclose that the unique IP address packets are redundant or that one of the packets is selected by a router based on the value of a metric included in each packet, the value associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station. Therefore, for at least these reasons (in addition to depending from an allowable independent claim and from Claims 2, 11, 19, 27, 30 and 33), Appellant respectfully requests allowance of Claims 3, 12, 20, 28, 31 and 34.

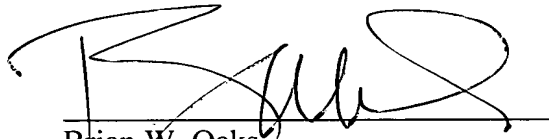
Conclusion

Appellant has demonstrated that the present invention, as claimed, is clearly distinguishable over the prior art cited by the Examiner. Therefore, Appellant respectfully requests the Board of Patent Appeals and Interferences to reverse the final rejection of the Examiner and instruct the Examiner to issue a notice of allowance of all claims.

Appellant has enclosed a check in the amount of \$500.00 for this Appeal Brief. Appellant believes no additional fees are due. The Commissioner is hereby authorized to charge any fee and credit any overpayment to Deposit Account No. 02-0384 of Baker Botts L.L.P.

Respectfully submitted,

BAKER BOTTS L.L.P.
Attorneys for Appellant



Brian W. Oaks
Reg. No. 44,981

Date: December 28, 2005

Correspondence Address:

Customer Number 05073



Appendix A: Claims on Appeal

1. (Previously Presented) A communications system, comprising:
a mobile unit operable to transmit redundant content to a plurality of base transceiver stations, a copy of the content transmitted to each base transceiver station being encoded using a code that is related to the codes used to encode copies of the content transmitted to the other base transceiver stations;
a plurality of base transceiver stations, each base transceiver station operable to:
receive a copy of the coded content from the mobile unit;
generate a packet including the coded content; and
communicate the packet; and
a decoder operable to:
receive a plurality of packets each including a copy of the coded content, each packet generated at a different base transceiver station;
decode the content in the packets by concatenating the related codes used to encode each copy of the content; and
generate one or more redundant packets including the decoded content.
2. (Original) The system of Claim 1, further comprising a router operable to:
receive a plurality of redundant packets from the decoder; and
select one of the redundant packets using a packet selection technique.
3. (Original) The system of Claim 2, wherein:
each base transceiver station is further operable to:
determine a value for a metric associated with communications between the mobile unit and the base transceiver station; and
generate a packet including the value and the coded content;
the decoder is operable to generate one or more redundant packets including the value and the decoded content; and
the router is operable to select one of the redundant packets based on the value included in each packet.

4. (Original) The system of Claim 1, wherein the related codes used to encode the copies of the content are orthogonally related.

5. (Original) The system of Claim 1, wherein the related codes used to encode the copies of the content are punctured codes.

6. (Original) The system of Claim 1, wherein the related codes are serially concatenated.

7. (Original) The system of Claim 1, wherein the related codes are concatenated in parallel.

8. (Original) The system of Claim 1, wherein the mobile unit is further operable to transmit each copy of coded content in a packet.

9. (Original) The system of Claim 1, wherein the content comprises voice information received from a user of the mobile unit.

10. (Original) A network device comprising:
- an interface operable to receive a plurality of redundant packets each generated at a different base transceiver station and each including a copy of coded content originating from a mobile unit, the coded content in each packet encoded using a code that is related to the codes used to encode the copies of the content in the other packets; and
- a processor operable to:
- decode the content in the packets by concatenating the related codes used to encode each copy of the content; and
- generate one or more redundant packets including the decoded content.
11. (Original) The network device of Claim 10, wherein the processor is further operable to select one of a plurality of redundant packets including the decoded content using a packet selection technique.
12. (Original) The network device of Claim 11, wherein the processor is further operable to select one of the redundant packets based on a value of a metric included in each packet, the value of the metric in each packet associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station.
13. (Original) The network device of Claim 10, wherein the related codes used to encode the copies of the content are orthogonally related.

14. (Original) The network device of Claim 10, wherein the related codes used to encode the copies of the content are punctured codes.

15. (Original) The network device of Claim 10, wherein the related codes are serially concatenated.

16. (Original) The network device of Claim 10, wherein the related codes are concatenated in parallel.

17. (Original) The network device of Claim 10, wherein the content comprises voice information received from a user of the mobile unit.

18. (Original) A method for error correction using redundant packets, comprising:
receiving a plurality of redundant packets each generated at a different base transceiver station and each including a copy of coded content originating from a mobile unit, the coded content in each packet encoded using a code that is related to the codes used to encode the copies of the content in the other packets;

decoding the content in the packets by concatenating the related codes used to encode each copy of the content; and

generating one or more redundant packets including the decoded content.

19. (Original) The method of Claim 18, further comprising selecting one of a plurality of redundant packets including the decoded content using a packet selection technique.

20. (Original) The method of Claim 19, wherein selecting one of the redundant packets comprises selecting a redundant packet based on a value of a metric included in each packet, the value of the metric in each packet associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station.

21. (Original) The method of Claim 18, wherein the related codes used to encode the copies of the content are orthogonally related.

22. (Original) The method of Claim 18, wherein the related codes used to encode the copies of the content are punctured codes.

23. (Original) The method of Claim 18, wherein the related codes are serially concatenated.

24. (Original) The method of Claim 18, wherein the related codes are concatenated in parallel.

25. (Original) The method of Claim 18, wherein the content comprises voice information received from a user of the mobile unit.

26. (Previously Presented) A method for error correction using redundant packets, comprising:

transmitting redundant content to a plurality of base transceiver stations from a mobile unit, a copy of the content transmitted to each base transceiver station being encoded using a code that is related to the codes used to encode copies of the content transmitted to the other base transceiver stations;

receiving a copy of the coded content from the mobile unit at each of a plurality of base transceiver stations;

generating a packet including the coded content at each base transceiver stations;

communicating the packets to a decoder;

decoding the content in the packets by concatenating the related codes used to encode each copy of the content; and

generating one or more redundant packets including the decoded content.

27. (Original) The method of Claim 26, further comprising selecting one of a plurality of redundant packets including the decoded content using a packet selection technique.

28. (Original) The method of Claim 27, wherein selecting one of the redundant packets comprises selecting a redundant packet based on a value for a metric included in each packet, the value of the metric associated with communications between the mobile unit and the base transceiver station.

29. (Original) Error correction software embodied in a computer-readable medium and operable to:

receive a plurality of redundant packets each generated at a different base transceiver station and each including a copy of coded content originating from a mobile unit, the coded content in each packet encoded using a code that is related to the codes used to encode the copies of the content in the other packets;

decode the content in the packets by concatenating the related codes used to encode each copy of the content; and

generate one or more redundant packets including the decoded content.

30. (Original) The software of Claim 29, further operable to select one of a plurality of redundant packets including the decoded content using a packet selection technique.

31. (Original) The software of Claim 30, wherein selecting one of the redundant packets comprises selecting a redundant packet based on a value of a metric included in each packet, the value of the metric in each packet associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station.

32. (Original) A system for error correction using redundant packets, comprising:
means for receiving a plurality of redundant packets each generated at a different base transceiver station and each including a copy of coded content originating from a mobile unit, the coded content in each packet encoded using a code that is related to the codes used to encode the copies of the content in the other packets;
means for decoding the content in the packets by concatenating the related codes used to encode each copy of the content; and
means for generating one or more redundant packets including the decoded content.

33. (Original) The system of Claim 32, further comprising means for selecting one of a plurality of redundant packets including the decoded content using a packet selection technique.

34. (Original) The system of Claim 33, wherein the means for selecting is operable to select a redundant packet based on a value of a metric included in each packet, the value of the metric in each packet associated with communications between the mobile unit and the base transceiver station that received the copy of the content included in the packet from the mobile station.

Appendix B: Evidence

NONE

Appendix C: Related Proceedings

NONE